

#### **California Sportfishing Protection Alliance**

"An Advocate for Fisheries, Habitat and Water Quality"
3536 Rainier Avenue, Stockton, CA 95204
T: 209-464-5067, F: 209-464-1028, E: deltakeep@aol.com, W: www.calsport.org

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Mr. Ken Landau, Assistant Executive Officer Mr. Jim Pedri, Assistant Executive Officer (Redding) Regional Water Quality Control Board Central Valley Region 11020 Sun Center Drive, Suite 200 Rancho Cordova, CA 95670-6144

RE: Renewal Of Waste Discharge Requirements (NPDES No. CA0077828) for Nevada County Sanitation District No. 1, Lake Wildwood Wastewater Treatment Plant, Nevada County

Dear Messrs. Landau and Pedri,

The California Sportfishing Protection Alliance (CSPA) has reviewed the proposed Waste Discharge Requirements (NPDES No. CA0077828) for Nevada County Sanitation District No. 1, Lake Wildwood Wastewater Treatment Plant (Permit) and submits the following comments.

CSPA requests status as a designated party for this proceeding. CSPA is a 501(c)(3) public benefit conservation and research organization established in 1983 for the purpose of conserving, restoring, and enhancing the state's water quality and fishery resources and their aquatic ecosystems and associated riparian habitats. CSPA has actively promoted the protection of water quality and fisheries throughout California before state and federal agencies, the State Legislature and Congress and regularly participates in administrative and judicial proceedings on behalf of its members to protect, enhance, and restore California's degraded water quality and fisheries. CSPA members reside, boat, fish and recreate in and along waterways throughout the Central Valley, including Nevada County.

1. The proposed Permit allows for a discharge of secondary wastewater under defined stream flow conditions but has not been adequately characterized and does not contain Effluent Limitations for priority pollutants in accordance with Federal Regulations 40 CFR 122.21 (e), 40 CFR 122.44(d)(1), and the CTR 40 CFR 131.

The proposed Permit allows for the discharge of secondary, rather than tertiary, under minimum stream flow conditions that provide a hydraulic dilution of 20-to-1, as is shown in Effluent Limitations Tables 6 and 7. The sampling for priority pollutants was apparently only conducted while tertiary treatment was being provided. As can be seen from the Effluent Limitations tables, secondary treated wastewater is of a lower quality than tertiary. The total suspended solids limitations for secondary are 30 mg/l as opposed to 10 mg/l for tertiary. Similar

differences apply for BOD. The solids and BOD removal is also indicative of the removal of other pollutants, as TSS and BOD are indicator parameters of the effectiveness of the treatment process. In short, one can expect a greater variety and higher concentrations of priority pollutants to be present in secondary wastewater as compared to tertiary. The apparent only time that a 20-to-1 dilution ratio is available in Deer Creek is when the community of Lake Wildwood discharges water from their reservoir to lower the lake level to conduct shoreline "maintenance". In the past, the time of reservoir discharges have been conducted while salmon are migrating into the area and are spawning. The water quality would be especially critical during this period. The allowance for a discharge of secondary wastewater is not based on any characterization of priority pollutants under this discharge condition.

The proposed Permit Fact Sheet states that: "Filter effluent is disinfected with gaseous chlorine and dechlorinated with sulfur dioxide. The chlorine contact basin provides 35 minutes of contact time at the peak hour flow of 2.4 mgd. After disinfection and dechlorination, the treated effluent is discharged to Deer Creek." The Title 22 chlorine contact time for reclaimed water and as recommended by the California Department of Public Health (DPH) to protect the contact recreation beneficial uses of the receiving stream is 90 minutes. The proposed Permit does not provide any information regarding whether the beneficial uses are protected and the adequacy of the disinfection system during the allowed 20-to-1 discharge. The proposed permit also requires that: "6. Other Special Provisions, Wastewater shall be oxidized, coagulated, filtered, and adequately disinfected pursuant to the DHS (recently changed to Department of Public Health or DPR) reclamation criteria, California Code of Regulations, Title 22, Division 4, Chapter 3, (Title 22), or equivalent. The filters shall be used to the maximum extent possible when dilution is greater than 20:1 receiving water to effluent flow." The proposed Permit is silent on whether the current system is capable of "adequate disinfection" under the allowed discharge scenarios and whether the beneficial uses are fully protected.

Federal Regulation, 40 CFR 122.21(e) states in part that: "The Director shall not issue a permit before receiving a complete application for a permit except for NPDES general permits. State Report of Waste Discharge form 200 is required as a part of a complete Report of Waste Discharge. Form 200, part VI states that: "To be approved, your application must include a complete characterization of the discharge." The California Toxics Rule (CTR)(40 CFR 131, Water Quality Standards) contains water quality standards applicable to this wastewater discharge. The final due date for compliance with CTR water quality standards for all wastewater dischargers in California is May 2010. The State's *Policy for Implementation of Toxics standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (SIP), Section 1.2, requires wastewater dischargers to provide all data and other information requested by the Regional Board before the issuance, reissuance, or modification of a permit to the extent feasible. EPA established the CTR in May of 2000 (Federal Register / Vol. 65, No. 97 / Thursday, May 18, 2000 / Rules and Regulations, Environmental Protection Agency 40 CFR

Part 131, Water Quality Standards; Establishment of Numeric Criteria for Priority Toxic Pollutants for the State of California) which promulgates: numeric aquatic life criteria for 23 priority toxic pollutants; numeric human health criteria for 57 priority toxic pollutants; and a compliance schedule provision which authorizes the State to issue schedules of compliance for new or revised National Pollutant Discharge Elimination System permit limits based on the federal criteria when certain conditions are met. Section *3, Implementation,* requires that once the applicable designated uses and water quality criteria for a water body are determined, under the National Pollutant Discharge Elimination System (NPDES) program discharges to the water body must be characterized and the permitting authority must determine the need for permit limits. If a discharge causes, has the reasonable potential to cause, or contributes to an excursion of a numeric or narrative water quality criteria, the permitting authority must develop permit limits as necessary to meet water quality standards. These permit limits are water quality-based effluent limitations or WQBELs. The terms "cause," "reasonable potential to cause," and "contribute to" are the terms in the NPDES regulations for conditions under which water quality based permit limits are required (See 40 CFR 122.44(d)(1)).

The proposed Permit is not based on a characterization of the secondary wastestream and the Regional Board has not provided the basis for secondary related priority pollutant limitations as is required by Federal Regulation 40 CFR § 124.6(d) which requires that a draft permit contain all information required by 40 CFR §§ 122.41, 122.42, 122.43, 122.44 122.47, 122.48. The wastewater treatment plant is not at or nearing capacity and the allowance to discharge secondary treated wastewater is not necessary. The allowance to discharge secondary wastewater must be removed or the proposed permit modified to include Effluent Limitations based on a complete characterization as required by the applicable regulations.

## 2. The proposed Permit contains a Groundwater Limitation that does not comply with the Antidegradation Policy (Resolution 68-16) and California Water Code (CWC) Sections 13146 and 13247.

The State Board has adopted an Antidegradation Policy (Resolution 68-16), which the Regional Board has incorporated into its Basin Plan. The Regional Board is required by the CWC to comply with the Antidegradation Policy. The Policy does not allow degradation of water quality unless the Discharger provides best practicable treatment and control of the discharge and the degradation was been shown to be in the interest of the people of California. The proposed Permit contains the following: "B. Groundwater Limitations: 1. The release of waste constituents from any storage, treatment, or disposal component shall not cause the groundwater to exceed water quality objectives, unreasonably affect beneficial uses, or cause a condition of pollution or nuisance." The Groundwater Limitation does not prohibit degradation and there is no basis in the proposed permit of accompanying Fact Sheet to allow degradation. The Groundwater Limitation must be revised to prohibit degradation or Findings added to fulfill the requirements of the Antidegradation Policy for allowing degradation. Any such allowance for

degradation would also need to meet the requirements of CCR Title 27 and the applicable exemptions for wastewater and/or sludge discharges.

The proposed Permit does not contain enforceable Effluent Limitations for chronic toxicity and therefore does not comply with the Basin Plan, Federal Regulations, at 40 CFR 122.44 (d)(1)(i) and the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (SIP).

Proposed Permit, State Implementation Policy states that: "On March 2, 2000, the State Water Board adopted the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (State Implementation Policy or SIP). The SIP became effective on April 28, 2000 with respect to the priority pollutant criteria promulgated for California by the USEPA through the NTR and to the priority pollutant objectives established by the Regional Water Board in the Basin Plan. The SIP became effective on May 18, 2000 with respect to the priority pollutant criteria promulgated by the USEPA through the CTR. The State Water Board adopted amendments to the SIP on February 24, 2005 that became effective on July 13, 2005. The SIP establishes implementation provisions for priority pollutant criteria and objectives and provisions for chronic toxicity control. Requirements of this Order implement the SIP."

The SIP, Section 4, Toxicity Control Provisions, Water Quality-Based Toxicity Control, states that: "A chronic toxicity effluent limitation is required in permits for all dischargers that will cause, have a reasonable potential to cause, or contribute to chronic toxicity in receiving waters." The SIP is a state *Policy* and CWC Sections 13146 and 13247 require that the Board in carrying out activities which affect water quality shall comply with state policy for water quality control unless otherwise directed by statute, in which case they shall indicate to the State Board in writing their authority for not complying with such policy.

Federal regulations, at 40 CFR 122.44 (d)(1)(i), require that limitations must control all pollutants or pollutant parameters which the Director determines are or may be discharged at a level which will cause, or contribute to an excursion above any State water quality standard, including state narrative criteria for water quality. There has been no argument that domestic sewage contains toxic substances and presents a reasonable potential to cause toxicity if not properly treated and discharged. The Water Quality Control Plan for the Sacramento/ San Joaquin River Basins (Basin Plan), Water Quality Objectives (Page III-8.00) for Toxicity is a narrative criteria which states that all waters shall be maintained free of toxic substances in concentrations that produce detrimental physiological responses in human, plant, animal, or aquatic life. The Proposed Permit contains a narrative Effluent Limitation prohibiting the discharge of chronically toxic substances: however a *Compliance Determination* has been added to the proposed Permit: "Compliance with the accelerated monitoring and TRE/TIE provisions of Provision VI.C.2.a shall constitute compliance with effluent limitations contained in sections

IV.A.1.d and IV.B.1.d of this Order for chronic whole effluent toxicity ". The *Compliance Determination* nullifies the Effluent Limitation and makes toxic discharges unenforceable.

The proposed Permit requires that: "2. Special Studies, Technical Reports and Additional Monitoring Requirements Chronic Whole Effluent Toxicity. For compliance with the Basin Plan's narrative toxicity objective, this Order requires the Discharger to conduct chronic whole effluent toxicity testing, as specified in the Monitoring and Reporting Program."

The Basin Plan narrative Toxicity Objective states that: "All waters shall be maintained free of toxic substances in concentrations that produce detrimental physiological responses in human, plant, or aquatic life. This objective applies regardless of whether the toxicity is caused by a single substance or the interactive effect of multiple substances. Compliance with this objective will be determined by analyses of indicator organisms, species diversity, population density, growth anomalies, and biotoxicity tests of appropriate duration or other methods as specified by the Regional Board."

According to the Basin Plan toxicity sampling is required to determine compliance with the requirement that all waters be maintained free of toxic substances. Sampling does not equate with or ensure that waters are free of toxic substances. The Tentative Permit requires the Discharger to conduct an investigation of the possible sources of toxicity if a threshold is exceeded. This language is not a limitation and essentially eviscerates the Regional Board's authority, and the authority granted to third parties under the Clean Water Act, to find the Discharger in violation for discharging chronically toxic constituents. An enforceable effluent limitation for chronic toxicity must be included in the Order.

3. The proposed Permit replaces Effluent Limitations for turbidity which were present in the existing permit; contrary to the Antibacksliding requirements of the Clean Water Act and Federal Regulations, 40 CFR 122.44 (l)(1).

Under the Clean Water Act (CWA), point source dischargers are required to obtain federal discharge (NPDES) permits and to comply with water quality based effluent limits (WQBELs) in NPDES permits sufficient to make progress toward the achievement of water quality standards or goals. The antibacksliding and antidegradation rules clearly spell out the interest of Congress in achieving the CWA's goal of continued progress toward eliminating all pollutant discharges. Congress clearly chose an overriding environmental interest in clean water through discharge reduction, imposition of technological controls, and adoption of a rule against relaxation of limitations once they are established.

Upon permit reissuance, modification, or renewal, a discharger may seek a relaxation of permit limitations. However, according to the CWA, relaxation of a WQBEL is permissible only if the requirements of the antibacksliding rule are met. The antibacksliding regulations prohibit EPA

from reissuing NPDES permits containing interim effluent limitations, standards or conditions less stringent than the final limits contained in the previous permit, with limited exceptions. These regulations also prohibit, with some exceptions, the reissuance of permits originally based on best professional judgment (BPJ) to incorporate the effluent guidelines promulgated under CWA §304(b), which would result in limits less stringent than those in the previous BPJ-based permit. Congress statutorily ratified the general prohibition against backsliding by enacting §§402(o) and 303(d)(4) under the 1987 Amendments to the CWA. The amendments preserve present pollution control levels achieved by dischargers by prohibiting the adoption of less stringent effluent limitations than those already contained in their discharge permits, except in certain narrowly defined circumstances.

When attempting to backslide from WOBELs under either the antidegradation rule or an exception to the antibacksliding rule, relaxed permit limits must not result in a violation of applicable water quality standards. The general prohibition against backsliding found in §402(o)(1) of the Act contains several exceptions. Specifically, under §402(o)(2), a permit may be renewed, reissued, or modified to contain a less stringent effluent limitation applicable to a pollutant if: (A) material and substantial alterations or additions to the permitted facility occurred after permit issuance which justify the application of a less stringent effluent limitation; (B)(i) information is available which was not available at the time of permit issuance (other than revised regulations, guidance, or test methods) and which would have justified the application of a less stringent effluent limitation at the time of permit issuance; or (ii) the Administrator determines that technical mistakes or mistaken interpretations of law were made in issuing the permit under subsection (a)(1)(B) of this section; (C) a less stringent effluent limitation is necessary because of events over which the permittee has no control and for which there is no reasonably available remedy [(e.g., Acts of God)]; (D) the permittee has received a permit modification under section 1311(c), 1311(g), 1311(h), 1311(i), 1311(k), 1311(n), or 1326(a) of this title; or (E) the permittee has installed the treatment facilities required to meet the effluent limitations in the previous permit, and has properly operated and maintained the facilities, but has nevertheless been unable to achieve the previous effluent limitations, in which case the limitations in the reviewed, reissued, or modified permit may reflect the level of pollutant control actually achieved (but shall not be less stringent than required by effluent guidelines in effect at the time of permit renewal, reissuance, or modification).

Even if a discharger can meet either the requirements of the antidegradation rule under §303(d)(4) or one of the statutory exceptions listed in §402(o)(2), there are still limitations as to how far a permit may be allowed to backslide. Section 402(o)(3) acts as a floor to restrict the extent to which BPJ and water quality-based permit limitations may be relaxed under the antibacksliding rule. Under this subsection, even if EPA allows a permit to backslide from its previous permit requirements, EPA may never allow the reissued permit to contain effluent limitations which are less stringent than the current effluent limitation guidelines for that

pollutant, or which would cause the receiving waters to violate the applicable state water quality standard adopted under the authority of §303.49.

Federal regulations 40 CFR 122.44 (l)(1) have been adopted to implement the antibacksliding requirements of the CWA:

- (l) Reissued permits. (1) Except as provided in paragraph (l)(2) of this section when a permit is renewed or reissued, interim effluent limitations, standards or conditions must be at least as stringent as the final effluent limitations, standards, or conditions in the previous permit (unless the circumstances on which the previous permit was based have materially and substantially changed since the time the permit was issued and would constitute cause for permit modification or revocation and reissuance under Sec. 122.62.)
- (2) In the case of effluent limitations established on the basis of Section 402(a)(1)(B) of the CWA, a permit may not be renewed, reissued, or modified on the basis of effluent guidelines promulgated under section 304(b) subsequent to the original issuance of such permit, to contain effluent limitations which are less stringent than the comparable effluent limitations in the previous permit.
- (i) Exceptions--A permit with respect to which paragraph (l)(2) of this section applies may be renewed, reissued, or modified to contain a less stringent effluent limitation applicable to a pollutant, if:
- (A) Material and substantial alterations or additions to the permitted facility occurred after permit issuance which justify the application of a less stringent effluent limitation;
- (B)(1) Information is available which was not available at the time of permit issuance (other than revised regulations, guidance, or test methods) and which would have justified the application of a less stringent effluent limitation at the time of permit issuance; or (2) The Administrator determines that technical mistakes or mistaken interpretations of law were made in issuing the permit under section 402(a)(1)(b);
- (C) A less stringent effluent limitation is necessary because of events over which the permittee has no control and for which there is no reasonably available remedy;
- (D) The permittee has received a permit modification under section 301(c), 301(g), 301(h), 301(i), 301(k), 301(n), or 316(a); or
- (E) The permittee has installed the treatment facilities required to meet the effluent limitations in the previous permit and has properly operated and maintained the facilities but has nevertheless been unable to achieve the previous effluent limitations, in which case the limitations in the

reviewed, reissued, or modified permit may reflect the level of pollutant control actually achieved (but shall not be less stringent than required by effluent guidelines in effect at the time of permit renewal, reissuance, or modification).

(ii) Limitations. In no event may a permit with respect to which paragraph (l)(2) of this section applies be renewed, reissued, or modified to contain an effluent limitation which is less stringent than required by effluent guidelines in effect at the time the permit is renewed, reissued, or modified. In no event may such a permit to discharge into waters be renewed, issued, or modified to contain a less stringent effluent limitation if the implementation of such limitation would result in a violation of a water quality standard under section 303 applicable to such waters.

The proposed Permit Fact Sheet discusses Pathogens and states that the previous Order established Effluent Limitations for turbidity. Turbidity limitations are maintained in the proposed Permit but have been moved to "Special Provisions", they are no longer Effluent Limitations. The Fact Sheet Pathogen discussion states that infectious agents in sewage are bacteria, parasites and viruses and that tertiary treatment is necessary to effectively remove these agents. This discussion also states that turbidity limitations were originally established: "...to ensure that the treatment system was functioning properly and could meet the limits for total coliform organisms. This discussion is incorrect. First, coliform organism limitations are also an indicator parameter of the effectiveness of tertiary treatment. The coliform limitations in the proposed and past Permit are significantly lower than the Basin Plan Water Quality Objective and are based on the level of treatment recommended by the California Department of Public Health (DPH). Second, both the coliform limitations and turbidity are recommended by DPH as necessary to protect recreational and irrigated agricultural beneficial uses of the receiving water. Turbidity has no lesser standing than coliform organisms in the DPH recommendation. Section 122.44(d) of 40 CFR requires that permits include water quality-based effluent limitations (WQBELs) to attain and maintain applicable numeric and narrative water quality criteria to protect the beneficial uses of the receiving water. There are no limitations for viruses and parasites in the proposed Permit, which the Regional Board has indicated, are necessary to protect the contact recreation and irrigated agricultural uses of the receiving water. Both coliform and turbidity limitations are treatment effectiveness indicators that the levels of bacteria viruses and parasites are adequately removed to protect the beneficial uses. Special Provisions are not Effluent Limitations as required by the Federal Regulations. The turbidity Effluent Limitations must be restored in accordance with the Clean Water Act and Federal regulations 40 CFR 122.44 (1)(1).

The only rational that can explain moving the turbidity from Effluent Limitations to Provisions is to protect Dischargers from mandatory minimum penalties prescribed by the California Water Code, Section 13385. It is doubtful that it was intent of the legislature in adopting the mandatory

penalty provisions to have the Regional Boards delete Effluent Limitations from permits to avoid penalties.

4. The proposed Permit contains no Effluent Limitations for settleable solids (SS) which are present in the existing NPDES Permit contrary to the Antibacksliding requirements of the Clean Water Act and Federal Regulations, 40 CFR 122.44 (I)(1).

Under the Clean Water Act (CWA), point source dischargers are required to obtain federal discharge (NPDES) permits and to comply with water quality based effluent limits (WQBELs) in NPDES permits sufficient to make progress toward the achievement of water quality standards or goals. The antibacksliding and antidegradation rules clearly spell out the interest of Congress in achieving the CWA's goal of continued progress toward eliminating all pollutant discharges. Congress clearly chose an overriding environmental interest in clean water through discharge reduction, imposition of technological controls, and adoption of a rule against relaxation of limitations once they are established.

Upon permit reissuance, modification, or renewal, a discharger may seek a relaxation of permit limitations. However, according to the CWA, relaxation of a WQBEL is permissible only if the requirements of the antibacksliding rule are met. The antibacksliding regulations prohibit EPA from reissuing NPDES permits containing interim effluent limitations, standards or conditions less stringent than the final limits contained in the previous permit, with limited exceptions. These regulations also prohibit, with some exceptions, the reissuance of permits originally based on best professional judgment (BPJ) to incorporate the effluent guidelines promulgated under CWA §304(b), which would result in limits less stringent than those in the previous BPJ-based permit. Congress statutorily ratified the general prohibition against backsliding by enacting §§402(o) and 303(d)(4) under the 1987 Amendments to the CWA. The amendments preserve present pollution control levels achieved by dischargers by prohibiting the adoption of less stringent effluent limitations than those already contained in their discharge permits, except in certain narrowly defined circumstances.

When attempting to backslide from WQBELs under either the antidegradation rule or an exception to the antibacksliding rule, relaxed permit limits must not result in a violation of applicable water quality standards. The general prohibition against backsliding found in §402(o)(1) of the Act contains several exceptions. Specifically, under §402(o)(2), a permit may be renewed, reissued, or modified to contain a less stringent effluent limitation applicable to a pollutant *if*: (A) material and substantial alterations or additions to the permitted facility occurred after permit issuance which justify the application of a less stringent effluent limitation; (B)(i) information is available which was not available at the time of permit issuance (other than revised regulations, guidance, or test methods) and which would have justified the application of a less stringent effluent limitation at the time of permit issuance; or (ii) the Administrator determines that technical mistakes or mistaken interpretations of law were made in issuing the

permit under subsection (a)(1)(B) of this section; (C) a less stringent effluent limitation is necessary because of events over which the permittee has no control and for which there is no reasonably available remedy [(e.g., Acts of God)]; (D) the permittee has received a permit modification under section 1311(c), 1311(g), 1311(h), 1311(i), 1311(k), 1311(n), or 1326(a) of this title; or (E) the permittee has installed the treatment facilities required to meet the effluent limitations in the previous permit, and has properly operated and maintained the facilities, but has nevertheless been unable to achieve the previous effluent limitations, in which case the limitations in the reviewed, reissued, or modified permit may reflect the level of pollutant control actually achieved (but shall not be less stringent than required by effluent guidelines in effect at the time of permit renewal, reissuance, or modification).

Even if a discharger can meet either the requirements of the antidegradation rule under §303(d)(4) or one of the statutory exceptions listed in §402(o)(2), there are still limitations as to how far a permit may be allowed to backslide. Section 402(o)(3) acts as a floor to restrict the extent to which BPJ and water quality-based permit limitations may be relaxed under the antibacksliding rule. Under this subsection, even if EPA allows a permit to backslide from its previous permit requirements, EPA may never allow the reissued permit to contain effluent limitations which are less stringent than the current effluent limitation guidelines for that pollutant, or which would cause the receiving waters to violate the applicable state water quality standard adopted under the authority of §303.49.

Federal regulations 40 CFR 122.44 (l)(1) have been adopted to implement the antibacksliding requirements of the CWA:

- (l) Reissued permits. (1) Except as provided in paragraph (l)(2) of this section when a permit is renewed or reissued, interim effluent limitations, standards or conditions must be at least as stringent as the final effluent limitations, standards, or conditions in the previous permit (unless the circumstances on which the previous permit was based have materially and substantially changed since the time the permit was issued and would constitute cause for permit modification or revocation and reissuance under Sec. 122.62.)
- (2) In the case of effluent limitations established on the basis of Section 402(a)(1)(B) of the CWA, a permit may not be renewed, reissued, or modified on the basis of effluent guidelines promulgated under section 304(b) subsequent to the original issuance of such permit, to contain effluent limitations which are less stringent than the comparable effluent limitations in the previous permit.
- (i) Exceptions--A permit with respect to which paragraph (l)(2) of this section applies may be renewed, reissued, or modified to contain a less stringent effluent limitation applicable to a pollutant, if:

- (A) Material and substantial alterations or additions to the permitted facility occurred after permit issuance which justify the application of a less stringent effluent limitation;
- (B)(1) Information is available which was not available at the time of permit issuance (other than revised regulations, guidance, or test methods) and which would have justified the application of a less stringent effluent limitation at the time of permit issuance; or (2) The Administrator determines that technical mistakes or mistaken interpretations of law were made in issuing the permit under section 402(a)(1)(b);
- (C) A less stringent effluent limitation is necessary because of events over which the permittee has no control and for which there is no reasonably available remedy;
- (D) The permittee has received a permit modification under section 301(c), 301(g), 301(h), 301(i), 301(k), 301(n), or 316(a); or
- (E) The permittee has installed the treatment facilities required to meet the effluent limitations in the previous permit and has properly operated and maintained the facilities but has nevertheless been unable to achieve the previous effluent limitations, in which case the limitations in the reviewed, reissued, or modified permit may reflect the level of pollutant control actually achieved (but shall not be less stringent than required by effluent guidelines in effect at the time of permit renewal, reissuance, or modification).
- (ii) Limitations. In no event may a permit with respect to which paragraph (l)(2) of this section applies be renewed, reissued, or modified to contain an effluent limitation which is less stringent than required by effluent guidelines in effect at the time the permit is renewed, reissued, or modified. In no event may such a permit to discharge into waters be renewed, issued, or modified to contain a less stringent effluent limitation if the implementation of such limitation would result in a violation of a water quality standard under section 303 applicable to such waters.

The existing NPDES permit for this facility contains Effluent Limitations for settleable solids (SS). The most important physical characteristic of wastewater is its total solids content. SS are an approximate measure of the quantity of sludge that will be removed by sedimentation. Low, medium and high strength wastewaters will generally contain 5 ml/l, 10 ml/l and 20 ml/l of SS, respectively. Knowledge of SS parameters is critical for proper wastewater treatment plant design, evaluating sludge quantities, operation and troubleshooting. Excessive SS in the effluent discharge are typically indicative of process upset or overloading of the system. Failure to limit and monitor for SS limits the regulators ability to assess facility operations and determine compliance. The proposed Permit, page F-5, states that: "The plant has periodically experience poorly settling sludge causing elevated solids within the secondary effluent. However, current secondary process operation (two ditches in service, longer sludge ages, sequencing of aerators) has improved clarifier performance" verifying the need for SS limitations.

The proposed Permit also states in the Fact Sheet that: "s. Settleable Solids. For inland surface waters, the Basin Plan states "[w] ater shall not contain substances in concentrations that result

in the deposition of material that causes nuisance or adversely affects beneficial uses." The previous Order contained effluent limitations of 0.1 mL/L as a monthly average and 0.2 mL/L as a daily maximum. Tertiary treatment processes result in solids removal reflective of the design capabilities of the treatment system. The TSS limitations of 10 mg/L (monthly average), 15 mg/L (weekly average) and 30 mg/L (daily maximum) include suspended and settleable matter in the analysis and an analysis for settleable matter is no longer necessary. With the TSS limitations in place, the settleable solids limits can be removed as an effluent limitation." The proposed Permit does not present any technical reference for concluding that a reduction in suspended solids will result in a reduction of settleable solids. We could not locate any technical reference that states such is the case. Our experience and best professional judgment in the wastewater industry is that the statement regarding settleable and suspended solids being measured in the same test is incorrect. Federal Regulation 40 CFR § 124.6(d) requires that a draft permit contain all information required by 40 CFR §§ 122.41, 122.42, 122.43, 122.44 122.47, 122.48. Federal Regulation 40 CFR § 124.6(c) further requires that draft permits must comply with 40 CFR §§ 124.7, 124.8, 124.9, 124.10, 124.11, 124.12, 124.15 and 124.17. The basis for the statements that a reduction in suspended solids will result in a reduction in settleable solids must be referenced.

"The TSS limitations of 10 mg/L (monthly average), 15 mg/L (weekly average) and 30 mg/L (daily maximum) include suspended and settleable matter in the analysis and an analysis for settleable matter is no longer necessary." This quotation from the proposed Permit is incorrect. Suspended solids analyses do not include evaluation of settleable solids content. The two parameters are not even measured in the same terms; suspended solids are measured on a mass per volume (mg/l) basis, while settleable solids are measured on a volume per volume (ml/l) basis. The two parameters are not directly comparable. The suspended solids analysis does not measure settleable solids. In addition to an inability to assess the bypass of sludge, elimination of the settleable solids limitation and monitoring requirements will render the proposed Permit incapable of assessing compliance with the Basin Plan objective cited above.

Settleable matter is a water quality objective in the Basin Plan and an indicator of wastewater treatment plant upset conditions. Suspended solids do not measure the same upset parameters as settleable solids. Failure to include an Effluent Limitations for SS threatens to allow violation of the settleable matter receiving water limitation and an inability to assess periods of plant upset. We applaud the operators if indeed they did not violate the SS limitation during the life of the existing permit; this does not however remove the reasonable potential to cause exceedances in the future during system upsets or overloading; this also does not constitute "new" information as is required under the antibacksliding regulations.

5. The Basin Plan, Implementation, Page IV-24-00, Prohibitions, prohibits the discharge of wastewater to low flow streams as a permanent means of disposal and

#### requires the evaluation of land disposal alternatives, Implementation, Page IV-15.00, Policies and Plans (2) Wastewater Reuse Policy.

The Basin Plan, Implementation, Page IV-24-00, Regional Water Board Prohibitions, states that: "Water bodies for which the Regional Water Board has held that the direct discharge of waste is inappropriate as a permanent disposal method include sloughs and streams with intermittent flow or limited dilution capacity." The proposed Permit characterizes the receiving stream as low flow, or ephemeral, with no available dilution. The proposed Permit contains the following requirement: "Reuse of Municipal Wastewater Feasibility Study: The Discharger shall evaluate the feasibility of utilizing reclaimed municipal wastewater from the new treatment facility for beneficial reuse to reduce area dependence on existing surface and groundwater water supply sources. A report containing the study conclusions of feasible wastewater reuse alternatives shall be completed and submitted within 12 months of the adoption date of this **Order** for approval by the Executive Officer" but fails to discuss any efforts to eliminate the discharge to surface water and compliance with the Basin Plan Prohibition. Federal Regulation 40 CFR 122.4 states that no permit shall be issued for any discharge when the conditions of the permit do not provide for compliance with the applicable requirements of the CWA and are inconsistent with a plan or plan amendment. The permit must be amended to require that the Discharger develop a workplan to eliminate the wastewater discharge to surface water in accordance with the Basin Plan.

In accordance with the Basin Plan, Implementation, Page IV-15.00, Policies and Plans (2) Wastewater Reuse Policy, the Discharger was required as a part of the Report of Waste Discharge to submit a land disposal and reuse analysis – which does not appear to have been submitted since it is not discussed in the proposed Permit. The permit must be amended to require that the Discharger develop a workplan to eliminate the wastewater discharge to surface water in accordance with the Basin Plan.

6. The proposed Permit requires the Discharger conduct a study of receiving water temperature thresholds although the beneficial uses of cold water aquatic life including spawning for endangered salmon and the associated temperature thresholds for protecting the beneficial use is well documented.

The proposed Permit requires that: "Receiving Water Temperature Study: The Discharger shall conduct a temperature study in Deer Creek to determine adequate temperature thresholds downstream of the discharge (R-2). The results of the study shall be submitted as part of the Report of Waste Discharge for renewal." Salmon migration and spawning in the lower reaches of Deer Creek is well documented, as is the Department of Fish and Game's (DFG) involvement in the site-specific uses in the receiving stream. The temperatures necessary to protect cold water aquatic species as well as the spawning beneficial use has been established in previous NPDES permits, specifically Lincoln, Deer Creek and Placerville. Please keep in mind here that

the Discharger, the community of Lake Wildwood, has the ability to control receiving water temperatures by controlling the reservoir release points. Temperature should be treated as any other pollutant. If a reasonable potential analysis shows the effluent temperatures have a reasonable potential to cause harm to the aquatic life beneficial use; an Effluent Limitation is mandated by 40 CFR 122.44. CWC Section 13267 requires that the reasons for requiring technical reports be detailed. The basis for requiring the temperature study is not detailed in the Fact Sheet. There is also no information regarding the 5-year time schedule for producing the proposed study; the required information already exists in the DFG and the Regional Board files and should be sufficient to determine if an Effluent Limitation for temperature is required.

7. The proposed Permit establishes Effluent Limitations for metals based on the hardness of the effluent as opposed to the ambient upstream receiving water hardness as required by Federal Regulations, the California Toxics Rule (CTR, 40 CFR 131.38(c)(4)).

Federal Regulation 40 CFR 131.38(c)(4) states that: "For purposes of calculating freshwater aquatic life criteria for metals from the equations in paragraph (b)(2) of this section, for waters with a hardness of 400 mg/l or less as calcium carbonate, the actual ambient hardness of the surface water shall be used in those equations." (Emphasis added). The proposed Permit states that the effluent hardness and the downstream hardness were used to calculate Effluent Limitations for metals. The definition of ambient is "in the surrounding area", "encompassing on all sides". It has been the Region 5, Sacramento, NPDES Section, in referring to Basin Plan objectives for temperature, to define ambient as meaning upstream. It is reasonable to assume, after considering the definition of ambient, that EPA is referring to the hardness of the receiving stream before it is potentially impacted by an effluent discharge. It is also reasonable to make this assumption based on past interpretations and since EPA, in permit writers' guidance and other reference documents, generally assumes receiving streams have dilution, which would ultimately "encompass" the discharge. Ambient conditions are in-stream conditions unimpacted by the discharge.

The Federal Register, Volume 65, No. 97/Thursday, May 18<sup>th</sup> 2000 (31692), adopting the California Toxics Rule in confirming that the ambient hardness is the upstream hardness, absent the wastewater discharge, states that: "A hardness equation is most accurate when the relationship between hardness and the other important inorganic constituents, notably alkalinity and pH, are nearly identical in all of the dilution waters used in the toxicity tests and in the surface waters to which the equation is to be applied. If an effluent raises hardness but not alkalinity and/or pH, using the lower hardness of the downstream hardness might provide a lower level of protection than intended by the 1985 guidelines. If it appears that an effluent causes hardness to be inconsistent with alkalinity and/or pH the intended level of protection will usually be maintained or exceeded if either (1) data are available to demonstrate that alkalinity and/or pH do not affect the toxicity of the metal, or (2) the hardness used in the hardness

equation is the hardness of upstream water that does not include the effluent. The level of protection intended by the 1985 guidelines can also be provided by using the WER procedure."

The proposed Permit goes into great detail citing the Federal Regulation requiring the receiving water hardness be used to establish Effluent Limitations. The result of using a higher effluent or downstream hardness value is that metals are toxic at higher concentrations, discharges have less reasonable potential to exceed water quality standards and the resulting Permits have fewer Effluent Limitations. The comparative Effluent Limitation values presented to defend the unsupported statements regarding which is more protective. Once again the public is subject to a bureaucrat "knowing better" and simply choosing to ignore very clear regulatory requirements. The Regional Board staff have chosen to deliberately ignore Federal Regulations placing themselves above the law. There are procedures for changing regulations if peer reviewed science indicates the need to do so, none of which have been followed. The proposed Permit failure to include Effluent Limitations for metals based on the actual ambient hardness of the surface water is contrary to the cited Federal Regulation and must be amended to comply with the cited regulatory requirement.

#### 8. The proposed permit contains an inadequate reasonable potential by using incorrect statistical multipliers as required by Federal regulations, 40 CFR § 122.44(d)(1)(ii).

Federal regulations, 40 CFR § 122.44(d)(1)(ii), state "when determining whether a discharge causes, has the reasonable potential to cause, or contributes to an in-stream excursion above a narrative or numeric criteria within a State water quality standard, the permitting authority shall use procedures which account for existing controls on point and nonpoint sources of pollution, the variability of the pollutant or pollutant parameter in the effluent, the sensitivity of the species to toxicity testing (when evaluating whole effluent toxicity), and where appropriate, the dilution of the effluent in the receiving water." Emphasis added. The reasonable potential analysis fails to consider the statistical variability of data and laboratory analyses as explicitly required by the federal regulations. The proposed Permit states that: "The Regional Water Board conducted the RPA in accordance with Section 1.3 of the SIP. Although the SIP applies directly to the control of CTR priority pollutants, the State Water Board has held that the Regional Water Board may use the SIP as guidance for water quality-based toxics control. The SIP states in the introduction "The goal of this Policy is to establish a standardized approach for permitting discharges of toxic pollutants to non-ocean surface waters in a manner that promotes statewide consistency." Therefore, in this Order the RPA procedures from the SIP were used to evaluate reasonable potential for both CTR and non-CTR constituents." The procedures for computing variability are detailed in Chapter 3, pages 52-55, of USEPA's Technical Support Document For Water Quality-based Toxics Control. The Regional Water Board conducted the RPA in accordance with Section 1.3 of the SIP. The proposed Permit states that: "Although the SIP applies directly to the control of CTR priority pollutants, the State Water Board has held that the Regional Water Board may use the SIP as guidance for water quality-based toxics control"

but fails to discuss compliance with 40 CFR § 122.44(d)(1)(ii). The State and Regional Boards do not have the authority to override and ignore federal regulation. A statistical analysis results in a projected maximum effluent concentration (MEC) based on laboratory variability and the resulting MEC is greater than was obtained from the actual sampling data. The result of using statistical variability is that a greater number of constituents will have a reasonable potential to exceed water quality standards and therefore a permit will have a greater number of effluent limitations. The intentional act of ignoring the Federal regulation has a clear intent of limiting the number of regulated constituents in an NPDES permit. The fact that the SIP illegally ignores this fundamental requirement does not exempt the Regional Board from its obligation to consider statistical variability in compliance with federal regulations. The failure to utilize statistical variability results in significantly fewer Effluent Limitations that are necessary to protect the beneficial uses of receiving waters. The reasonable potential analyses for CTR constituents are flawed and must be recalculated.

9. The proposed Permit fails to contain an Effluent Limitation for carbon tetrachloride in violation of the California Toxics Rule, Federal Regulations (40 CFR 122.44), the California Water Code (CWC), Section 13377 and the State's Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California (SIP).

The maximum observed effluent (MEC) concentration for carbon tetrachloride was 0.5 µg/L. The CTR criterion for human health protection for consumption of water and aquatic organisms is 0.25 µg/L. Carbon tetrachloride was detected in the effluent in one sample out of a total of seven samples. In the one sample collected in July 2003, the laboratory reported a "Detected but not Quantified" (DNQ) at 0.4 µg/L. In accordance with Federal Regulations, 40 CFR 122.44, the Regional Board is required to establish an effluent limitation if a pollutant is measures in the effluent which presents a reasonable potential to exceed a water quality standard of objective. In accordance with the SIP, Section 1.3, since the maximum effluent concentration exceeded a water quality standard, an effluent limitation is required. California Water Code, section 13377, requires that: "Notwithstanding any other provision of this division, the state board and the regional boards shall, as required or authorized by the Federal Water Pollution Control Act, as amended, issue waste discharge and dredged or fill material permits which apply and ensure compliance with all applicable provisions of the act and acts amendatory thereof or supplementary, thereto, together with any more stringent effluent standards or limitations necessary to implement water quality control plans, or for the protection of beneficial uses, or to prevent nuisance."

Federal Regulations, 40 CFR 122.44(d), requires that limits must be included in permits where pollutants will cause, have reasonable potential to cause, or contribute to an exceedance of the State's water quality standards. US EPA has interpreted 40 CFR 122.44(d) in *Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program* (Factsheets

and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where the preponderance of evidence clearly indicates the potential to cause or contribute to an exceedance of State water quality standards (even though the data may be sparse or absent) a limit MUST be included in the permit."

In this case there were 7 data points. Seven data points to represent 5-years of discharge (NPDES permit have a five year life cycle) or 7-days out of 1,825 days or 0.4% of the actual discharge was characterized. The Regional Board requires an inadequate sampling base to adequately characterize the discharge utilizing standard statistical procedures and then chooses to throw out the few limited data points. The DNQ designation is sufficient to confirm the presence of carbon tetrachloride above the CTR water quality standard and should not have been arbitrarily discarded. The measured concentrations of carbon tetrachloride at 0.5 µg/l clearly exceed the CTR water quality standard of 0.25 µg/l and in accordance with Federal and State Regulations and the SIP, effluent limitations are required. Federal Regulation, 40 CFR 122.4 (a), (d) and (g) require that no permit may be issued when the conditions of the permit do not provide for compliance with the applicable requirements of the CWA, or regulations promulgated under the CWA, when imposition of conditions cannot ensure compliance with applicable water quality requirements and for any discharge inconsistent with a plan or plan amendment approved under Section 208(b) of the CWA.

# 10. The proposed Permit fails to contain an Effluent Limitation for copper in violation of the California Toxics Rule, Federal Regulations (40 CFR 122.44), the California Water Code (CWC), Section 13377.

The CTR includes a hardness-dependent standard for the protection of freshwater aquatic life for copper. The CTR standards for metals are presented in dissolved concentrations. The US EPA default conversion factors for copper in freshwater are 0.96 for both the acute and the chronic criteria. Using the worst-case measured hardness from the receiving water (48 mg/L as CaCO3) and the USEPA recommended dissolved-to-total translator, the applicable chronic criterion (maximum four-day average concentration) is 5.0 µg/L and the applicable acute criterion (maximum one-hour average concentration) is 7.0 µg/L, as total recoverable. Copper was detected at concentrations ranging from 2.6 to 6.1 µg/L in the effluent exceeding the chronic CTR water quality standard. In accordance with Federal Regulations, 40 CFR 122.44, the Regional Board is required to establish an effluent limitation for copper since the pollutant was measured in the effluent and not only presents a reasonable potential to exceed, but actually exceeds the CTR water quality standard of objective.

Federal Regulation 40 CFR 131.38(c)(4) states that: "For purposes of calculating freshwater aquatic life criteria for metals from the equations in paragraph (b)(2) of this section, for waters with a hardness of 400 mg/l or less as calcium carbonate, the actual ambient hardness of the

surface water shall be used in those equations." (Emphasis added). The proposed Permit states that the effluent hardness and the downstream hardness were used to calculate Effluent Limitations for metals. The definition of *ambient* is "in the surrounding area", "encompassing on all sides". It has been the Region 5, Sacramento, NPDES Section, in referring to Basin Plan objectives for temperature, to define *ambient* as meaning upstream. It is reasonable to assume, after considering the definition of ambient, that EPA is referring to the hardness of the receiving stream before it is potentially impacted by an effluent discharge. It is also reasonable to make this assumption based on past interpretations and since EPA, in permit writers' guidance and other reference documents, generally assumes receiving streams have dilution, which would ultimately "encompass" the discharge. Ambient conditions are in-stream conditions unimpacted by the discharge. The receiving water hardness is the appropriate and legal hardness to use to determine reasonable potential, which in this case results in the need for an Effluent Limitation for copper.

The proposed Permit however states that: "Using effluent hardness to establish the objectives for copper no reasonable potential to cause or contribute to an in-stream excursion above the NTR criterion exists. Quarterly monitoring has been established for hardness and copper in this Order to gather additional information to determine if copper is present in the effluent above the CTR criterion. Should monitoring results indicate that the discharge has the reasonable potential to cause or contribute to an exceedance of a water quality standard, this Order may be reopened and modified by adding an appropriate effluent limitation."

The proposed Permit methodology does not result in an effluent Limitation for copper. The proposed Permit methodology does not utilize the actual ambient hardness of the surface water as mandated by Federal Regulation 40 CFR 131.38(c)(4). The proposed Permit methodology is not in accordance with US EPA's interpretation of 40 CFR 122.44(d) in *Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program* (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where calculations indicate reasonable potential, a specific numeric limit MUST be included in the permit. Additional "studies" or data collection efforts may not be substituted for enforceable permit limits where "reasonable potential" has been determined." The proposed Permit must be revised to include an Effluent Limitation for copper.

### 11. The proposed Permit fails to contain an Effluent Limitation for Diquat in violation of Federal Regulations (40 CFR 122.44) and the California Water Code (CWC), Section 13377.

USEPA's Ambient Water Quality Criteria for freshwater aquatic life protection (instantaneous maximum standard) for diquat is 0.5  $\mu$ g/L. Diquat was detected at 15  $\mu$ g/L, in one of seven samples collected between May 2003 and October 2006 exceeding the water quality criteria. In

accordance with Federal Regulations, 40 CFR 122.44, the Regional Board is required to establish an effluent limitation for diquat since the pollutant was measured in the effluent and not only presents a reasonable potential to exceed, but actually exceeds the water quality criteria.

The proposed Permit fails to include an Effluent Limitation for diquat and states that: "The treatment facility effluent is primarily domestic wastewater and the high value reported for a chemical that is used as an aquatic herbicide is questionable. Because diquat was only detected in one sample, it is uncertain whether collection and procedures were adequate and whether reasonable potential to cause or contribute to an in-stream excursion above the ambient water quality criterion exists. Quarterly monitoring has been established for diquat in this Order to gather additional information to determine if diquat is present in the effluent. Should monitoring results indicate that the discharge has the reasonable potential to cause or contribute to an exceedance of a water quality standard, this Order may be reopened and modified by adding an appropriate effluent limitation."

The permit writer fails to recognize that the Lake Wildwood community is constructed around a lake and many of the homes have lake front property where aquatic weeds are well established as a nuisance. It is not unreasonable that the sporadic use of aquatic herbicides would be used at Lake Wildwood. Even if this were not the case, the level of diguat exceeds the water quality objective and an Effluent Limitation is required in accordance with 40 CFR 122.44. Federal Regulations, 40 CFR 122.44(d), requires that limits must be included in permits where pollutants will cause, have reasonable potential to cause, or contribute to an exceedance of the State's water quality standards. US EPA has interpreted 40 CFR 122.44(d) in Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where the preponderance of evidence clearly indicates the potential to cause or contribute to an exceedance of State water quality standards (even though the data may be sparse or absent) a limit MUST be included in the permit." These tenets also include that "where calculations indicate reasonable potential, a specific numeric limit MUST be included in the permit. Additional "studies" or data collection efforts may not be substituted for enforceable permit limits where "reasonable potential" has been determined."

### 12. The proposed Permit fails to contain an Effluent Limitation for MBAS in violation of Federal Regulations (40 CFR 122.44) and the California Water Code (CWC), Section 13377.

The Secondary Maximum Contaminant Level (MCL)-Consumer Acceptance Limit for foaming agents (MBAS) is  $500 \mu g/L$ . MBAS was detected at  $540 \mu g/L$  in one of seven samples collected between May 2003 and October 2006. In accordance with Federal Regulations, 40 CFR 122.44, the Regional Board is required to establish an effluent limitation for MBAS since the pollutant

was measured in the effluent and not only presents a reasonable potential to exceed, but actually exceeds the drinking water maximum contaminant level (MCL) which is incorporated into the Basin Plan as a *chemical constituents* water quality standard.

The proposed Permit does not establish an Effluent Limitation for MBAS but states that: "Because MBAS was only detected in only one sample, it is uncertain whether reasonable potential to cause or contribute to an in-stream excursion above the secondary MCL exists. Quarterly monitoring has been established for MBAS in this Order to gather additional information to determine if MBAS is present in the effluent."

Federal Regulations, 40 CFR 122.44(d), requires that limits must be included in permits where pollutants will cause, have reasonable potential to cause, or contribute to an exceedance of the State's water quality standards. US EPA has interpreted 40 CFR 122.44(d) in *Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program* (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where the preponderance of evidence clearly indicates the potential to cause or contribute to an exceedance of State water quality standards (even though the data may be sparse or absent) a limit MUST be included in the permit." These tenets also include that "where calculations indicate reasonable potential, a specific numeric limit MUST be included in the permit. Additional "studies" or data collection efforts may not be substituted for enforceable permit limits where "reasonable potential" has been determined."

13. The proposed Permit properly contains Effluent Limitations for Dibromochloromethane and Dichlorobromomethane, but is accompanied by a proposed compliance Time Schedule Order (TSO) that exceeds the CTR compliance deadline of 18 May 2010. The proposed permit is silent regarding the CTR compliance timeline.

The proposed Permit properly contains Effluent Limitations for Dibromochloromethane and Dichlorobromomethane. Both Dibromochloromethane and Dichlorobromomethane Dibromochloromethane are water quality standards in the CTR. For both constituents however, the proposed Permit states that: "Sample results for the effluent indicate that the Discharger will not be able to meet the new limitations. The Discharger has indicated in a Revised Infeasibility Report submitted 1 August 2008 that additional time will be required to comply with the final effluent limits for dibromochloromethane. The Discharger anticipates that the addition of ultraviolet disinfection and eliminating chlorine will be necessary in order to comply with the effluent limitations, and the new or modified control measures cannot be designed, installed, and put into operation within a reasonable period of time. Furthermore, the effluent limitations for dibromochloromethane are a new regulatory requirement within this permit, which become effective upon the effective date of this Order. Therefore, a compliance time schedule order for

compliance with dibromochloromethane effluent limitations is established in TSO No. R5-2009-XXXX in accordance with CWC sections 13000 and 13385. Order No. R5-2009-XXXX also includes interim effluent limitations."

The CTR contains a requirement for full compliance by 18 May 2010. Federal Regulation 40 CFR 131.38(e)(3) formerly authorized compliance schedules delaying the effective date of WQBELs being set based on the NTR and CTR. Pursuant to 40 CFR section 131.38(e)(8), however, this compliance schedule authorization *expressly expired* on May 18, 2005, depriving the State and Regional Boards with any authority to issue compliance schedules delaying the effective date of such WQBELs. Indeed, the EPA Federal Register Preamble accompanying the CTR stated as much, noting, "EPA has chosen to promulgate the rule with a sunset provision which states that the authorizing compliance schedule provision will cease or sunset on May 18, 2005."

The Regional Board may contend that the EPA Federal Register Preamble has effectively extended this compliance schedule authority when the Preamble observed, "[I]f the State Board adopts, and EPA approves, a statewide authorizing compliance schedule provision significantly prior to May 18, 2005, EPA will act to stay the authorizing compliance schedule provision in today's rule." It is true that the State Board subsequently adopted its Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California, enacted by State Board Resolution No. 2000-015 (March 2, 2000) ("State Implementation Plan" or "SIP") and that the SIP provides for compliance schedules without imposing a May 18, 2005 cutoff. EPA, however, *has not* acted to stay 40 C.F.R. section 131.38(e)(8) by the only means it can lawfully do so: notice and comment rulemaking that amends 40 C.F.R. section 131.38(e)(8). Without such a rulemaking, 40 C.F.R. section 131.38(e)(8) remains the law and it unequivocally ends authorization to issue compliance schedules after May 18, 2000. *See Friends of the Earth, Inc. v. Environmental Protection Agency*, 446 F.3d 140 (D.C. Cir. 2006).

Even if 40 C.F.R. section 131.38(e)(8) did not preclude issuing compliance schedules which delay the effective date of WQBELs set under the NTR and CTR, the CWA itself precludes such compliance schedules—and any compliance schedule which delays the effective date of WQBELs past 1977. The Federal Regulation 40 CFR section 131.38(e)(8) compliance schedule authorization expiration on May 18, 2005 allowed a five-year period, the life of an NPDES permit, until May 18, 2010 to achieve full compliance. The proposed Permit does not discuss the compliance schedules exceeding the CTR compliance deadline. Instead it appears that the Regional Board's interpretation is that compliance schedules need to be moved from the NPDES permit to a compliance order rather than to requiring full compliance by the designated due date. The Basin Plan, *Policy for Application of Water Quality Objectives*, page IV-17, requires that compliance schedules be a short as is practicable; instead the Regional Board's Orders simply allow 5-years, the life of the permit. At a minimum, the proposed Permit must discuss the CTR

compliance timeline and include an assessment that a compliance schedule is as short as is practicable.

# 14. The proposed Permit fails to contain an Effluent Limitation for Alpha-BHC (alpha-hexachlorocyclohexane and Aldrin in violation of Federal Regulations (40 CFR 122.44) and the California Water Code (CWC), Section 13377.

Alpha-BHC (alpha-hexachlorocyclohexane) was detected in one of seven samples collected between May 2003 and October 2006 at a concentration of  $0.035~\mu g/L$ . Aldrin was reported once as detected but not quantified at  $0.005~\mu g/L$  in one out of seven sampling events between May 2003 and October 2006. Each of these constituents is a chlorinated hydrocarbon pesticide. The Basin Plan requires that no individual pesticides shall be present in concentrations that adversely affect beneficial uses; discharges shall not result in pesticide concentrations in bottom sediments or aquatic life that adversely affect beneficial uses; total chlorinated hydrocarbon pesticides shall not be present in the water column at detectable concentrations; and pesticide concentrations shall not exceed those allowable by applicable antidegradation policies. The CTR contains numeric criteria for alpha-BHC and aldrin of  $0.0039~\mu g/L$  and  $0.00013~\mu g/L$  respectively for freshwaters from which both water and organisms are consumed. Alpha-BHC (alpha-hexachlorocyclohexane and Aldrin exceeded the non-detectable Basin Plan water quality objective and the CTR water quality standard.

The proposed Permit does not establish an Effluent Limitation for Alpha-BHC (alpha-hexachlorocyclohexane and Aldrin but states that: "However, in 14 additional samples collected between March 2007 and July 2008, alpha-BHC and aldrin were not detected at the minimum acceptable reporting level as indicated in appendix 4 of the SIP. Based on the new information it does not appear that there is reasonable potential to cause or contribute to an in-stream excursion above the Basin Plan Objective. Annual monitoring is included in this Order for alpha-BHC and aldrin. Should monitoring results indicate that the discharge has the reasonable potential to cause or contribute to an exceedance of a water quality standard, this Order may be reopened and modified by adding an appropriate effluent limitation."

Alpha-BHC (alpha-hexachlorocyclohexane and Aldrin are pesticides and would be expected to be used in slug loads, not continuously. The single detected samples would not represent an unusual circumstance where the chemical is expected to be used during isolated events. Federal Regulations, 40 CFR 122.44(d), requires that limits must be included in permits where pollutants will cause, have reasonable potential to cause, or contribute to an exceedance of the State's water quality standards. US EPA has interpreted 40 CFR 122.44(d) in *Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program* (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where the preponderance of evidence clearly indicates the potential to cause or contribute to an

exceedance of State water quality standards (even though the data may be sparse or absent) a limit MUST be included in the permit." These tenets also include that "where calculations indicate reasonable potential, a specific numeric limit MUST be included in the permit. Additional "studies" or data collection efforts may not be substituted for enforceable permit limits where "reasonable potential" has been determined."

15. The proposed Permit fails to contain an Effluent Limitation for Gamma BHC (Lindane) in violation of Federal Regulations (40 CFR 122.44) and the California Water Code (CWC), Section 13377.

Gamma-BHC (lindane) was detected in the effluent in four out of seven CTR sampling events between May 2003 and October 2006, with concentrations ranging from  $0.012~\mu g/L$  to  $0.14~\mu g/L$ . The CTR contains a numeric criterion for lindane of  $0.019~\mu g/L$ . The detection of lindane in the effluent indicates a reasonable potential to exceed the Basin Plan limitations for the CTR criterion for lindane.

The proposed Permit fails to include an Effluent Limitation for lindane. Federal Regulations, 40 CFR 122.44(d), requires that limits must be included in permits where pollutants will cause, have reasonable potential to cause, or contribute to an exceedance of the State's water quality standards. US EPA has interpreted 40 CFR 122.44(d) in *Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program* (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where the preponderance of evidence clearly indicates the potential to cause or contribute to an exceedance of State water quality standards (even though the data may be sparse or absent) a limit MUST be included in the permit." These tenets also include that "where calculations indicate reasonable potential, a specific numeric limit MUST be included in the permit. Additional "studies" or data collection efforts may not be substituted for enforceable permit limits where "reasonable potential" has been determined."

16. The Proposed Permit Fails to Include Limitations that are Protective of the Municipal and Domestic Beneficial Uses of the Receiving Stream Contrary to Federal Regulations 40 CFR 122.4, 122.44(d) and the California Water Code, Section 13377.

The proposed Permit contains Findings that municipal and domestic supply (MUN) are beneficial uses of the receiving stream as designated in the Sacramento San Joaquin River Basins Water Quality Control Plan (Basin Plan). The proposed Permit states that: "The beneficial uses of the Deer Creek include municipal and domestic supply, water contact recreation, and agricultural irrigation supply, and there is, at times, less than 20:1 dilution. To protect these beneficial uses, the Regional Water Board finds that the wastewater must be disinfected and

adequately treated to prevent disease." The proposed Permit does not discuss however that an unregulated drinking water intake could reasonably exist just above the confluence of Deer Creek and the Yuba River, where a commercial facility and part time residence has been established. The California Department of Public Health (DPH) regulates large drinking water systems and the County regulates smaller drinking water systems, however systems serving less than 5 connections are not regulated. Federal Regulation, 40 CFR 122.4 (a), (d) and (g) require that no permit may be issued when the conditions of the permit do not provide for compliance with the applicable requirements of the CWA, or regulations promulgated under the CWA, when imposition of conditions cannot ensure compliance with applicable water quality requirements and for any discharge inconsistent with a plan or plan amendment approved under Section 208(b) of the CWA. Section 122.44(d) of 40 CFR requires that permits include water quality-based effluent limitations (WQBELs) to attain and maintain applicable numeric and narrative water quality criteria to protect the beneficial uses of the receiving water. California Water Code, section 13377, requires that: "Notwithstanding any other provision of this division, the state board and the regional boards shall, as required or authorized by the Federal Water Pollution Control Act, as amended, issue waste discharge and dredged or fill material permits which apply and ensure compliance with all applicable provisions of the act and acts amendatory thereof or supplementary, thereto, together with any more stringent effluent standards or limitations necessary to implement water quality control plans, or for the protection of beneficial uses, or to prevent nuisance."

Direct ingestion is a more sensitive use of water than contact recreation uses or eating food crops irrigated with treated sewage. In 1987 DPH issued the *Uniform Guidelines for the Disinfection of Wastewater* (Uniform Guidelines) as recommendations to the Regional Water Quality Control Boards regarding disinfection requirements for wastewater discharges to surface waters. The Uniform Guidelines recommend a "no discharge" of treated domestic wastewater to freshwater streams used for domestic water supply. Where is not possible to prevent a wastewater discharge: the Uniform Guidelines recommend that no discharge be allowed unless a minimum of a twenty-to-one in stream dilution is available. The DPH has reiterated the recommendations of the Uniform Guidelines to the Central Valley Regional Board on numerous occasions: specifically a 1 July 2003 letter to the Executive Officer (Thomas Pinkos); a 28 September 2000 Memorandum to regional and district engineers from Jeff Stone; and cite specific recommendations for the City of Jackson's wastewater discharge. A discharge of tertiary treated domestic wastewater to an ephemeral stream is not protective of the domestic and municipal beneficial uses of the receiving stream.

CCR Title 22 is cited in the proposed Permit as the source of information for requiring tertiary treatment to protect the contact recreation and food crop irrigation beneficial uses of the receiving stream. CCR Title 22 does not discuss or provide a level of treatment adequate to protect drinking water. To the contrary, Title 22 contains numerous requirements (60310) to

prevent cross connections with potable water supplies, setback requirements from domestic supplies and wells, and warning signs not to drink the water: "RECLAIMED WATER DO NOT DRINK" verifying that tertiary treated domestic wastewater in not fit for human consumption. Tertiary treated wastewater discharged to ephemeral streams is not of adequate quality for municipal use and is therefore not protective of the DOM beneficial use.

The Basin Plan, Implementation, Page IV-24-00, prohibits the discharge of wastewater to low flow streams as a permanent means of disposal and requires the evaluation of land disposal alternatives, Implementation, Page IV-15.00, Policies and Plans (2) Wastewater Reuse Policy. The Basin Plan, Implementation, Page IV-24-00, Regional Water Board prohibitions, states that: "Water bodies for which the Regional Water Board has held that the direct discharge of waste is inappropriate as a permanent disposal method include sloughs and streams with intermittent flow or limited dilution capacity." The proposed Permit characterizes the receiving stream as low flow, or ephemeral, with no available dilution. The proposed Permit does not discuss any efforts to eliminate the discharge to surface water and compliance with the Basin Plan Prohibition. Federal Regulation 40 CFR 122.4 states that no permit shall be issued for any discharge when the conditions of the permit do not provide for compliance with the applicable requirements of the CWA and are inconsistent with a plan or plan amendment.

The proposed Permit does not protect the drinking water beneficial use of the receiving stream as is required by Federal Regulations 40 CFR 122.4, 122.44(d) and the California Water Code, Section 13377 and in accordance with these requirements cannot be issued. At a minimum, the permit must be amended to require that the Discharger develop a workplan to eliminate the wastewater discharge to surface water in accordance with the Basin Plan.

# 17. The proposed Permit fails to contain an Effluent Limitation for silver in violation of the California Toxics Rule, Federal Regulations (40 CFR 122.44), the California Water Code (CWC), Section 13377.

The CTR includes a hardness-dependent standard for the protection of freshwater aquatic life for silver. The CTR standards for metals are presented in dissolved concentrations. USEPA recommends conversion factors to translate dissolved concentrations to total concentrations. The conversion factor for silver in freshwater is 0.85 for the instantaneous maximum criterion. Using the worst-case measured hardness from the receiving water (48 mg/L as CaCO3) and the USEPA recommended dissolved-to-total translator, the applicable acute criterion (maximum 1-hour average concentration) is  $1.15~\mu g/L$ , as total recoverable (there is no published chronic water quality criterion for silver). Silver was detected at concentrations ranging from less than the 0.1  $\mu g/L$  detection limit to  $1.57~\mu g/L$  above the acute criterion in the effluent in seven samples collected between May 2003 and October 2006. In accordance with Federal Regulations, 40 CFR 122.44, the Regional Board is required to establish an effluent limitation for silver since the

pollutant was measured in the effluent and not only presents a reasonable potential to exceed, but actually exceeds the CTR water quality standard of objective.

Federal Regulation 40 CFR 131.38(c)(4) states that: "For purposes of calculating freshwater aquatic life criteria for metals from the equations in paragraph (b)(2) of this section, for waters with a hardness of 400 mg/l or less as calcium carbonate, the actual ambient hardness of the <u>surface water shall be used</u> in those equations." (Emphasis added). The proposed Permit states that the effluent hardness and the downstream hardness were used to calculate Effluent Limitations for metals. The definition of *ambient* is "in the surrounding area", "encompassing on all sides". It has been the Region 5, Sacramento, NPDES Section, in referring to Basin Plan objectives for temperature, to define *ambient* as meaning upstream. It is reasonable to assume, after considering the definition of ambient, that EPA is referring to the hardness of the receiving stream before it is potentially impacted by an effluent discharge. It is also reasonable to make this assumption based on past interpretations and since EPA, in permit writers' guidance and other reference documents, generally assumes receiving streams have dilution, which would ultimately "encompass" the discharge. Ambient conditions are in-stream conditions unimpacted by the discharge. The receiving water hardness is the appropriate and legal hardness to use to determine reasonable potential, which in this case results in the need for an Effluent Limitation for silver

The proposed Permit methodology does not result in an effluent Limitation for silver. The proposed Permit methodology does not utilize the actual ambient hardness of the surface water as mandated by Federal Regulation 40 CFR 131.38(c)(4). The proposed Permit methodology is not in accordance with US EPA's interpretation of 40 CFR 122.44(d) in *Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program* (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where calculations indicate reasonable potential, a specific numeric limit MUST be included in the permit. Additional "studies" or data collection efforts may not be substituted for enforceable permit limits where "reasonable potential" has been determined." The proposed Permit must be revised to include an Effluent Limitation for silver.

18. The proposed Permit appears to fail to utilize valid, reliable, and representative effluent data in conducting a reasonable potential and limits derivation calculations contrary to US EPA's interpretation of Federal Regulations, 40 CFR 122.44(d), and should not be adopted in accordance with 40 CFR 122.4 (a), (d) and (g) and CWC Section 13377.

The proposed Permit and attached Fact Sheet in discussing reasonable potential for individual constituents states that the data used dates from May 2003 through October 2006, a three-year period. Federal Regulation, 40 CFR 122.21(e) states in part that: "The Director shall not issue a

permit before receiving a complete application for a permit except for NPDES general permits. In accordance with 40 CFR 122.21 (e) and (h) and 124.3 (a)(2) the Regional Board shall not adopt the proposed permit without first a complete application, in this case for industrial or commercial facilities, for which the permit application requirements are extensive. An application for a permit is complete when the Director receives an application form and any supplemental information which are completed to his or her satisfaction. The completeness of any application for a permit shall be judged independently of the status of any other permit application or permit for the same facility or activity."

State Report of Waste Discharge form 200 is required as a part of a complete Report of Waste Discharge. Form 200, part VI states that: "To be approved, your application must include a complete characterization of the discharge." The Federal Report of Waste Discharge forms also require a significant characterization of a wastewater discharge.

The California Toxics Rule (CTR)(40 CFR 131, Water Quality Standards) contains water quality standards applicable to this wastewater discharge. The final due date for compliance with CTR water quality standards for all wastewater dischargers in California is May 2010. The State's *Policy for Implementation of Toxics standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (SIP), Section 1.2, requires wastewater dischargers to provide all data and other information requested by the Regional Board before the issuance, reissuance, or modification of a permit to the extent feasible.

EPA established the CTR in May of 2000 (Federal Register / Vol. 65, No. 97 / Thursday, May 18, 2000 / Rules and Regulations, Environmental Protection Agency 40 CFR Part 131, Water Quality Standards; Establishment of Numeric Criteria for Priority Toxic Pollutants for the State of California) which promulgates: numeric aquatic life criteria for 23 priority toxic pollutants; numeric human health criteria for 57 priority toxic pollutants; and a compliance schedule provision which authorizes the State to issue schedules of compliance for new or revised National Pollutant Discharge Elimination System permit limits based on the federal criteria when certain conditions are met. Section 3, Implementation, requires that once the applicable designated uses and water quality criteria for a water body are determined, under the National Pollutant Discharge Elimination System (NPDES) program discharges to the water body must be characterized and the permitting authority must determine the need for permit limits. If a discharge causes, has the reasonable potential to cause, or contributes to an excursion of a numeric or narrative water quality criteria, the permitting authority must develop permit limits as necessary to meet water quality standards. These permit limits are water quality-based effluent limitations or WQBELs. The terms "cause," "reasonable potential to cause," and "contribute to" are the terms in the NPDES regulations for conditions under which water quality based permit limits are required (See 40 CFR 122.44(d)(1)).

The SWRCB adopted the Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California (SIP) to implement the CTR. Section 1.2 Data Requirements and Adjustments, of the SIP requires that it is the discharger's responsibility to provide all data and other information requested by the RWQCB <u>before the issuance</u>, reissuance, or modification of a permit to the extent feasible. When implementing the provisions of this Policy, the RWQCB shall use all available, valid, relevant, representative data and information, as determined by the RWQCB.

Federal Regulation, 40 CFR 122.21(e) states in part that: "The Director shall not issue a permit before receiving a complete application for a permit except for NPDES general permits.

As is stated above it appears that the data set used to determine reasonable potential was limited to the three-year period from May 2003 through October 2006. The SIP required the Regional Board's to require dischargers to characterize their discharges for priority pollutants. On 10 September 2001, the Regional Board mailed out a California Water Code Section 13267 letter to dischargers requiring a minimum of quarterly sampling for priority pollutants, pesticides, drinking water constituents, and other pollutants. The Regional Board's 13267 letter cited SIP Section 1.2 as directing the Board to issue the letter requiring sampling sufficient to determine reasonable potential for priority pollutants and to calculate Effluent Limitations. The Regional Board's 13267 letter went beyond requiring sampling for CTR and NTR constituents and required a complete assessment for pesticides, drinking water constituents, temperature, hardness and pH and receiving water flow. There is no indication that any this data was ever received or that it was utilized in preparing the proposed permit.

California Water Code, section 13377, requires that: "Notwithstanding any other provision of this division, the state board and the regional boards shall, as required or authorized by the Federal Water Pollution Control Act, as amended, issue waste discharge and dredged or fill material permits which apply and ensure compliance with all applicable provisions of the act and acts amendatory thereof or supplementary, thereto, together with any more stringent effluent standards or limitations necessary to implement water quality control plans, or for the protection of beneficial uses, or to prevent nuisance." The application for permit renewal is incomplete or the Regional Board failed to utilize all the relevant data in developing the proposed Permit and in accordance with 40 CFR 122.21(e) the Regional Board should not issue a permit.

19. The Effluent Limitation for specific conductivity (EC) is improperly regulated as an annual average contrary to Federal Regulations 40 CFR 122.45 (d)(2) and common sense.

Federal Regulation 40 CFR 122.45 (d)(2) requires that permit for POTWs establish Effluent Limitations as average weekly and average monthly unless impracticable. The proposed Permit establishes the Effluent Limitation for EC as an annual average contrary to the cited Federal

Regulation. Establishing the Effluent Limitations for EC in accordance with the Federal Regulation is not impracticable; to the contrary the Central Valley Regional Board has a long history of having done so. Proof of impracticability is properly a steep slope and the Regional Board has not presented any evidence that properly and legally limiting EC, iron and manganese is impracticable.

20. The proposed Permit contains an inadequate antidegradation analysis that does not comply with the requirements of Section 101(a) of the Clean Water Act, Federal Regulations 40 CFR § 131.12, the State Board's Antidegradation Policy (Resolution 68-16) and California Water Code (CWC) Sections 13146 and 13247.

CWC Sections 13146 and 13247 require that the Board in carrying out activities which affect water quality shall comply with state policy for water quality control unless otherwise directed by statute, in which case they shall indicate to the State Board in writing their authority for not complying with such policy. The State Board has adopted the Antidegradation Policy (Resolution 68-16), which the Regional Board has incorporated into its Basin Plan. The Regional Board is required by the CWC to comply with the Antidegradation Policy.

Section 101(a) of the Clean Water Act (CWA), the basis for the antidegradation policy, states that the objective of the Act is to "restore and maintain the chemical, biological and physical integrity of the nation's waters." Section 303(d)(4) of the CWA carries this further, referring explicitly to the need for states to satisfy the antidegradation regulations at 40 CFR § 131.12 before taking action to lower water quality. These regulations (40 CFR § 131.12(a)) describe the federal antidegradation policy and dictate that states must adopt both a policy at least as stringent as the federal policy as well as implementing procedures.

California's antidegradation policy is composed of both the federal antidegradation policy and the State Board's Resolution 68-16 (State Water Resources Control Board, Water Quality Order 86-17, p. 20 (1986) ("Order 86-17); Memorandum from Chief Counsel William Attwater, SWRCB to Regional Board Executive Officers, "federal Antidegradation Policy," pp. 2, 18 (Oct. 7, 1987) ("State Antidegradation Guidance")). As a state policy, with inclusion in the Water Quality Control Plan (Basin Plan), the antidegradation policy is binding on all of the Regional Boards (Water Quality Order 86-17, pp. 17-18).

Implementation of the state's antidegradation policy is guided by the State Antidegradation Guidance, SWRCB Administrative Procedures Update 90-004, 2 July 1990 ("APU 90-004") and USEPA Region IX, "Guidance on Implementing the Antidegradation Provisions of 40 CFR 131.12" (3 June 1987) ("Region IX Guidance"), as well as Water Quality Order 86-17.

The Regional Board must apply the antidegradation policy whenever it takes an action that will lower water quality (State Antidegradation Guidance, pp. 3, 5, 18, and Region IX Guidance, p.

1). Application of the policy does not depend on whether the action will actually impair beneficial uses (State Antidegradation Guidance, p. 6). Actions that trigger use of the antidegradation policy include issuance, re-issuance, and modification of NPDES and Section 404 permits and waste discharge requirements, waiver of waste discharge requirements, issuance of variances, relocation of discharges, issuance of cleanup and abatement orders, increases in discharges due to industrial production and/or municipal growth and/other sources, exceptions from otherwise applicable water quality objectives, etc. (State Antidegradation Guidance, pp. 7-10, Region IX Guidance, pp. 2-3). Both the state and federal policies apply to point and nonpoint source pollution (State Antidegradation Guidance p. 6, Region IX Guidance, p. 4).

Actions that trigger use of the antidegradation policy include re-issuance of NPDES permits. However, the proposed permit simply states that: "4. Satisfaction of Antidegradation Policy The permitted discharge is consistent with the antidegradation provisions of 40 CFR 131.12 and State Water Board Resolution 68-16. Compliance with these requirements will result in the use of best practicable treatment or control of the discharge. The impact on existing water quality will be insignificant." The antidegradation analysis in the proposed Permit is not simply deficient, it is literally nonexistent. The brief discussion of antidegradation requirements, in the Findings and Fact Sheet, consist only of skeletal, unsupported, undocumented conclusory statements totally lacking in any factual analysis.

Even a minimal antidegradation analysis would require an examination of: 1) existing applicable water quality standards; 2) ambient conditions in receiving waters compared to standards; 3) incremental changes in constituent loading, both concentration and mass; 4) treatability; 5) best practicable treatment and control (BPTC); 6) comparison of the proposed increased loadings relative to other sources; 7) an assessment of the significance of changes in ambient water quality and 8) whether the waterbody was a ONRW. A minimal antidegradation analysis must also analyze whether: 1) such degradation is consistent with the maximum benefit to the people of the state; 2) the activity is necessary to accommodate important economic or social development in the area; 3) the highest statutory and regulatory requirements and best management practices for pollution control are achieved; and 4) resulting water quality is adequate to protect and maintain existing beneficial uses. A BPTC technology analysis must be done on an individual constituent basis; while tertiary treatment may provide BPTC for pathogens, dissolved metals may simply pass through.

## 21. The proposed Permit does not contain an Effluent Limitation for oil and grease in violation of Federal Regulations 40 CFR 122.44 and California Water Code Section 13377.

The proposed Permit is for a domestic wastewater treatment plant. Domestic wastewater treatment plants, by their nature, receive oil and grease in concentrations from home cooking and restaurants that present a reasonable potential to exceed the Basin Plan water quality objective

for oil and grease (Basin Plan III-5.00). Confirmation sampling is not necessary to establish that domestic wastewater treatment systems contain oil and grease in concentrations that present a reasonable potential to exceed the water quality objective. It is not unusual for sewerage systems to allow groundwater cleanup systems, such as from leaking underground tanks, to discharge into the sanitary sewer. Groundwater polluted with petroleum hydrocarbons can also infiltrate into the collection system as easily as sewage exfiltrates. The Central Valley Regional Board has a long established history of including oil and grease limitations in NPDES permits at 15 mg/l as a daily maximum and 10 mg/l as a monthly average, which has established BPTC for POTWs.

The California Water Code (CWC), Section 13377 states in part that: "...the state board or the regional boards shall...issue waste discharge requirements...which apply and ensure compliance with ...water quality control plans, or for the protection of beneficial uses..." Section 122.44(d) of 40 CFR requires that permits include water quality-based effluent limitations (WQBELs) to attain and maintain applicable numeric and narrative water quality criteria to protect the beneficial uses of the receiving water. Where numeric water quality objectives have not been established, 40 CFR §122.44(d) specifies that WQBELs may be established using USEPA criteria guidance under CWA section 304(a), proposed State criteria or a State policy interpreting narrative criteria supplemented with other relevant information, or an indicator parameter. US EPA has interpreted 40 CFR 122.44(d) in Central Tenets of the National Pollutant Discharge Elimination System (NPDES) Permitting Program (Factsheets and Outreach Materials, 08/16/2002) that although States will likely have unique implementation policies there are certain tenets that may not be waived by State procedures. These tenets include that "where the preponderance of evidence clearly indicates the potential to cause or contribute to an exceedance of State water quality standards (even though the data may be sparse or absent) a limit MUST be included in the permit." Failure to include an effluent limitation for oil and grease in the proposed permit violates 40 CFR 122.44 and CWC 13377.

Thank you for considering these comments. If you have questions or require clarification, please don't hesitate to contact us.

Sincerely,

Bill Jennings, Executive Director

California Sportfishing Protection Alliance